## **Amendments to the Claims**

This listing of claims will replace all prior versions, and listings, of claims in the application:

## **Listing of the Claims**

What is claimed is:

- 1. (Cancelled).
- 2. (Previously Presented) The method of claim 5 wherein the information on candidate access nodes in the mobile communication network is recorded in a candidate access node table that is shared among mobile terminals in the mobile communication network.
- 3. (Currently Amended) The method of claim 5 wherein the information identifying from the first access node comprises athe network address of the first access node.
- 4. (Previously Presented) The method of claim 5 wherein the information provided by the mobile terminal to the second access node comprises a ticket generated by the first access node for the mobile terminal.
- 5. (Currently Amended) A method of secure discovery of access nodes in a mobile communication network comprising the steps of:

providing a mobile terminal with information identifying from a first access node prior to handoff to another a second access node;

after handoff of the mobile terminal to athe second access node, receiving at the first providing the second access node with information from the mobile terminal, wherein the information from the mobile terminal comprises information from the first access node;

receiving at the first access node a message from the second access node requesting verification of the information provided by the mobile terminal to the second access node; and,

verifying the information provided by the mobile terminal to the second access node before updating information on candidate access nodes in the mobile communication network; and,

comparing a delay to a configurable threshold value, wherein the delay comprises a difference between a current system time and a stay time.

wherein the information provided by the mobile terminal to the second access node is verified by measuring delay occurring during the handoff of the mobile terminal to the second access node.

- 6. (Currently Amended) The method of claim 5 wherein timestamps recorded by the first access node and the second access node are utilized to measure the delay-occurring during the handoff of the mobile terminal to the second access node.
- 7. (Previously Presented) The method of claim 5 wherein the information provided by the mobile terminal to the second access node comprises an identifier for the mobile terminal and wherein the information is further verified by checking whether the mobile terminal that provided the information to the second access node is the same mobile terminal that communicated with the first access node prior to handoff.
- 8. (Previously Presented) The method of claim 5 wherein the message from the second access node is authenticated.
- 9. (Currently Amended) The method of claim 5 wherein a limit is placed on a number of messages received by the second access node from the mobile terminal prior to verifying the information provided by the mobile terminal to the second access node.
- 10. (Previously Presented) The method of claim 5 wherein the mobile terminals are Internet Protocol (IP) devices and wherein the access nodes are IP routers.
- 11. (Cancelled).

- 12. (Previously Presented) The access node of claim 13 wherein the information provided by the mobile terminal to the second access node comprises a ticket generated by the access node for the mobile terminal.
- 13. (Currently Amended) An access node comprising memory for storing information on candidate access nodes in a mobile communication network and a processor that executes device-readable instructions for performing the steps of:

providing a mobile terminal with information identifying from the access node prior to handoff to another a second access node;

after handoff of the mobile terminal to athe second access node, receiving a message from the second access node requesting verification of information provided by the mobile terminal to the second access node, wherein the information provided by the mobile terminal to the second access node comprises information from the access node; and,

verifying the information provided by the mobile terminal to the second access node before updating the information on candidate access nodes in the mobile communication network; and,

comparing a delay to a configurable threshold value, wherein the delay comprises a difference between a current system time and a stay time.

wherein the information provided by the mobile terminal to the second access node is verified by measuring delay occurring during the handoff of the mobile terminal to the second access node.

- 14. (Previously Presented) The access node of claim 13 wherein the information provided by the mobile terminal to the second access node comprises an identifier for the mobile terminal and wherein the information is further verified by checking whether the mobile terminal that provided the information to the second access node is the same mobile terminal that communicated with the access node prior to handoff.
- 15. (Previously Presented) The access node of claim 13 wherein the message from the second access node is authenticated.

16. (Previously Presented) The access node of claim 13 wherein the access node further comprises an Internet Protocol (IP) routing circuit.

## 17. (Cancelled).

18. (Currently Amended) A mobile terminal comprising memory and a handoff processing circuit that performs the steps of:

prior to handoff to another a second access node, receiving information identifying from a first access node and a ticket generated by the first access node;

storing the ticket and the information identifying from the first access node in the memory;

after handoff to a second access node, providing the ticket and the information identifying from the first access node to the second access node, so that the second access node can verify the ticket with the first access node prior to updating information on candidate access nodes in thea mobile communication network;

wherein the ticket is utilized by the <u>first and second</u> access nodes to <u>compare a</u> delay to a configurable threshold value, wherein the delay comprises the difference of a <u>current system time minus a time at which the ticket was generated minus a stay time.</u>

measure delay occurring during the handoff of the mobile terminal to the second access node.

- 19. (Previously Presented) The mobile terminal of claim 18 wherein the ticket comprises an identifier for the mobile terminal and wherein the ticket is further verified by checking whether the mobile terminal that provided the information to the second access node is the same mobile terminal that communicated with the first access node prior to handoff.
- 20. (Previously Presented) The mobile terminal of claim 18 wherein the mobile terminal is an Internet Protocol (IP) device.

21 - 31. (Cancelled)

- 32. (Previously Presented) The method of claim 5 wherein the message from the second access node comprises a physical (MAC) address of the first access node.
- 33. (Previously Presented) The method of claim 13 wherein the message from the second access node comprises a physical (MAC) address of the first access node.
- 34. (Cancelled)